



## **High Performance Computing Software**

*JPL Internal Seminar Series*

# **The Grid and its Application to Earth Sciences**

by

**Dr. Carl Kesselman**

**USC/Information Sciences Institute**

**Thursday, October 7, 2004**

**12:00 noon – 1:00 p.m.**

**Building 126, Room 112**

The Grid is an infrastructure that enabled the sharing of resources across distributed, multi-institutional collaborations. In doing so, the Grid allows data, computation, sensors and other critical information technology components to be accessible by team members regardless of their location and affiliation. The applications of the Grid are broad from enabling large-scale data analysis, access to large data sets or online access and analysis of sensor data. In this talk, I will introduce the Grid and overview the basic technology from which Grid infrastructure is built. I will illustrate the application of Grid with three examples related to earth sciences including climate modeling, geophysics and earthquake engineering.